



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/736,456	12/15/2003	Joseph Raymond Feldkamp	KCX-739 (19302)	3094
22827	7590	07/01/2005	EXAMINER	
DORITY & MANNING, P.A. POST OFFICE BOX 1449 GREENVILLE, SC 29602-1449			KLEMANSKI, HELENE G	
			ART UNIT	PAPER NUMBER
			1755	

DATE MAILED: 07/01/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/736,456

Applicant(s)

FELDKAMP, JOSEPH RAYMOND

Examiner

Helene Klemanski

Art Unit

1755

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-38 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-38 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. ____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. ____. |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date <u>5/17/04&9/27/04</u> . | 6) <input type="checkbox"/> Other: ____. |

DETAILED ACTION

Information Disclosure Statement

1. The references cited in the Search Report dated September 16, 2004 have been considered.

Specification

2. The specification is objected to as failing to provide proper antecedent basis for the claimed subject matter. See 37 CFR 1.75(d)(1) and MPEP § 608.01(o). Correction of the following is required: no literal antecedent basis is seen in the specification for the phrase "the additive being present in the ink composition at a mole fraction of less than about 0.1" in claim 31 (page 8, lines 14-17 of the specification disclose that the additive is present in the ink composition at a mole fraction of greater than 0.001, preferably .004-0.4.

The examiner suggests the incorporation of this phrase into the specification or the claims amended accordingly.

Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Art Unit: 1755

4. Claims 1, 2 and 7-14 are rejected under 35 U.S.C. 102(b) as being anticipated by Yoshida et al.

Yoshida et al. teach an aqueous ink jet ink composition comprising a water-soluble dye such as an acid dye (i.e. sulfonated dye), water and 0.01-20% by weight of an amino acid such as lysine, histidine, ornithine, arginine or derivatives thereof. The ink may further contain a water-soluble organic solvent and a surfactant. Yoshida et al. further teach an ink jet printing method comprising ejecting the above ink onto a substrate. See col. 2, lines 34-50, col. 3, lines 55-65, col. 4, lines 32-61, examples 1 and 2 and claims 1-4, 5 and 7. The ink jet ink composition as taught by Yoshida et al. appears to anticipate the present claims.

The only limitations in the claims not found by the examiner are (1) the additive having a polarity greater than the polarity of the solvent; (2) the additive preventing the dye from coalescing in the solvent thereby increasing the solubility of the dye in the solvent; (3) wherein the additive has a dipole moment greater than about 4 debye; (4) wherein the additive has a dipole moment greater than about 10 debye and (5) wherein the dielectric constant of the composition increases by at least 20% due to the presence of the additive. However, these limitations are considered inherent because there does not appear to be any reason why the cited reference would not contain a an additive (i.e. amino acid) with applicants claimed properties since the amino acid of the reference is the same as those preferred by applicants.

5. Claims 1, 2, 7-11, 13 and 14 are rejected under 35 U.S.C. 102(b) as being anticipated by JP 2001-139854.

JP 2001-139854 teaches an aqueous ink jet ink composition comprising a water-soluble dye such as an acid dye (i.e. sulfonated dye), water and an amino acid such as glycine, alanine, valine, leucine etc. JP 2001-139854 further teaches an ink jet printing method comprising ejecting the above ink onto a substrate. See the abstract. The ink jet ink composition as taught by JP 2001-139854 appears to anticipate the present claims.

The only limitations in the claims not found by the examiner are (1) the additive having a polarity greater than the polarity of the solvent; (2) the additive preventing the dye from coalescing in the solvent thereby increasing the solubility of the dye in the solvent; (3) wherein the additive has a dipole moment greater than about 4 debye; (4) wherein the additive has a dipole moment greater than about 10 debye and (5) wherein the dielectric constant of the composition increases by at least 20% due to the presence of the additive. However, these limitations are considered inherent because there does not appear to be any reason why the cited reference would not contain a an additive (i.e. amino acid) with applicants claimed properties since the amino acid of the reference is the same as those preferred by applicants.

6. Claims 1, 2 and 5-14 are rejected under 35 U.S.C. 102(b) as being anticipated by JP 08-302253.

JP 08-302253 teaches an aqueous ink jet ink composition comprising a water-soluble, water, a wetting agent and 0.01-10% by weight of an amino acid such as glycine, alanine, leucine, pr phenylalanine. The ink may further contain a water-soluble organic solvent and a surfactant. JP 08-302253 further teaches an ink jet printing

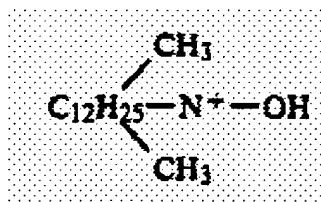
Art Unit: 1755

method comprising ejecting the above ink onto a substrate. See the abstract. The ink jet ink composition as taught by JP 08-302253 appears to anticipate the present claims.

The only limitations in the claims not found by the examiner are (1) the additive having a polarity greater than the polarity of the solvent; (2) the additive preventing the dye from coalescing in the solvent thereby increasing the solubility of the dye in the solvent; (3) wherein the additive has a dipole moment greater than about 4 debye; (4) wherein the additive has a dipole moment greater than about 10 debye and (5) wherein the dielectric constant of the composition increases by at least 20% due to the presence of the additive. However, these limitations are considered inherent because there does not appear to be any reason why the cited reference would not contain a an additive (i.e. amino acid) with applicants claimed properties since the amino acid of the reference is the same as those preferred by applicants.

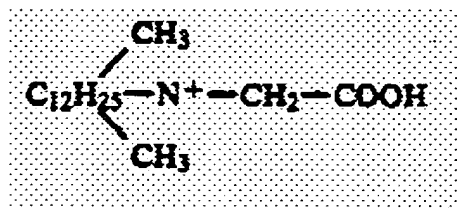
Claims 1-38 are rejected under 35 U.S.C. 102(b) as being anticipated by Moffatt et al.

Moffatt et al. teach an ink jet ink composition comprising a low vapor pressure solvent, water-soluble cationic dyes, a zwitterionic surfactant such as N,N-dimethyl-N-dodecyl amine oxide of the formula

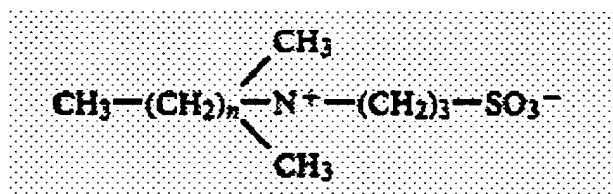


, N-dodecyl-N,N-dimethyl glycine of the formula

Art Unit: 1755



and sulfobetaines of the formula



(i.e. amino acid derivative) and water. See col. 2, lines 33-45, col. 3, lines 3-15 and lines 47-49, col. 4, lines 27-65, col. 5, lines 13-23, Table 1, col. 8, lines 13-18 and claims 1-3, 6, 7, 9, 10, 11 and 13. The ink jet ink composition as taught by Moffatt et al. appears to anticipate the present claims.

The only limitations in the claims not found by the examiner are (1) the additive having a polarity greater than the polarity of the solvent; (2) the additive preventing the dye from coalescing in the solvent thereby increasing the solubility of the dye in the solvent; (3) wherein the additive has a dipole moment greater than about 4 debye; (4) wherein the additive has a dipole moment greater than about 10 debye and (5) wherein the dielectric constant of the composition increases by at least 20% due to the presence of the additive. However, these limitations are considered inherent because there does not appear to be any reason why the cited reference would not contain a an additive (i.e. amino acid) with applicants claimed properties since the amino acid of the reference is the same as those preferred by applicants.

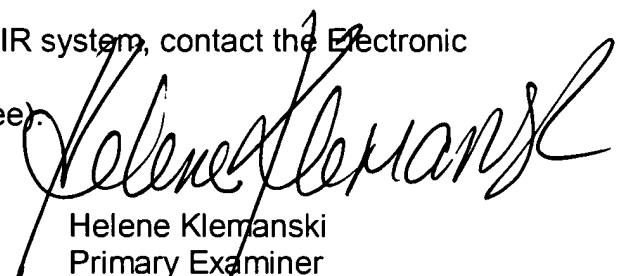
Conclusion


The remaining references listed on forms 892 and 1449 have been reviewed by the examiner and are considered to be cumulative to or less material than the prior art references relied upon in the above rejections.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Helene Klemanski whose telephone number is (571) 272-1370. The examiner can normally be reached on Monday-Friday 5:30-2:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jerry Lorengo can be reached on (571) 272-1233. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).


Helene Klemanski
Primary Examiner
Art Unit 1755


HK
June 25, 2005